

REMARKS

Claims 1-7, and 10-12 are pending in the application. Amendments to claims 1, and 10-12 have been submitted for entry after final. It is respectfully submitted that the claim amendments raise no new issues and would simplify issues for appeal. Favorable reconsideration of the application, as amended, is respectfully requested.

I. REJECTIONS OF CLAIMS 1-7, AND 10-12 UNDER 35 U.S.C. § 102

Claims 1-7, and 10-12 stand rejected under 35 U.S.C. § 102(a) as being anticipated by U.S. Patent No. 5,929,615 ("D'Angelo"). All pending claims are believed to be allowable for at least the following reasons. Withdrawal of the rejection is respectfully requested.

Independent claims 1, and 10-12 have been amended to further clarify pertinent features of the invention. Specifically, the invention defined in independent claim 1 now requires that "the switch control circuitry comprises a three terminal bucking DC voltage regulator ... for providing a control signal to the switch circuitry," and that "an output of the voltage regulator is coupled to the supply voltage node such that a change in the supply voltage varies an output current from the voltage regulator, and thereby varies an input current to the voltage regulator from which the control signal is generated." All other rejected independent claims, i.e., claims 10-12 contain recitations similar to those of claim 1 regarding the above-identified voltage regulator. Support for the claim amendments is found generally at page 6, lines 10-21 of the present specification referring to FIG. 1. Thus, no new matter has been introduced by the amendments. In addition, Applicants believe that these clarifying amendments do not raise any further issues and should not therefore require further searching by the Examiner. It is respectfully submitted that the limitations were inherently present in the previously submitted claims, and thus, no new matter has been introduced by the amendments.

One goal of the present invention is in providing an overvoltage protection circuit for interposing between an input voltage and a supply voltage. According to the present invention defined in claims 1, and 10-12, a change in the supply voltage (e.g., VCC in Fig. 1) varies an output current from the voltage regulator (e.g., an output current from VOUT of U1 in Fig. 1), and thereby varies an input current to the voltage regulator (e.g., an input current to VIN of U1 in Fig. 1) from which the control signal (e.g., a signal to the gate of Q1) is generated. In short, the present invention utilizes switch control circuitry including a three terminal bucking DC voltage regulator configured as a voltage controlled current source as claimed.

By contrast, D'Angelo fails to teach or suggest one of the above-identified claimed features, i.e., a three terminal bucking DC voltage regulator configured as a voltage controlled current source. As discussed fully in the previous response (filed April 3, 2003), the control unit 44 in the D'Angelo

system receives two inputs from the error amplifier 49 and the comparator 50, respectively, each of which receives a divided down version of the voltage at VOUT as an input. Depending on voltages of its two inputs, the control unit 44 controls its two output voltages to activate or deactivate the PMOS and NMOS transistors 34 and 46. See, column 5, lines 31-44 of D'Angelo.

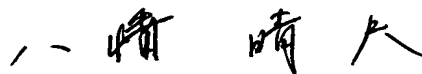
Importantly, the D'Angelo patent does not teach or suggest that a change in the VOUT voltage varies an output current from the control unit 44. Nor does D'Angelo teach or suggest that the D'Angelo system varies an input current to the control unit 44. In the D'Angelo system, the control unit 44 operates as a conventional controller which varies two output voltages (for the transistors 34 and 46) based on two input voltages (from the error amplifier 49, and the comparator 50), as opposed to a three terminal bucking DC voltage regulator configured as a voltage controlled current source as claimed. In fact, nothing in the D'Angelo patent suggests a voltage regulator functioning as a current source, in which a change in a supply voltage varies an output current from the voltage regulator, and thereby varies an input current to the voltage regulator from which a control signal is generated, as claimed.

In view of the foregoing, the D'Angelo patent cannot be said to anticipate the present invention. Therefore, the inventions defined in independent claims 1, and 10-12 and their dependent claims are believed to be patentable over the cited art. Withdrawal of the rejections is respectfully requested.

II. CONCLUSION

Applicants believe that all pending claims are in condition for allowance, and respectfully request a Notice of Allowance at an early date. If the Examiner believes a telephone conference would expedite prosecution of this application, please telephone the undersigned at 510-843-6200.

Respectfully submitted,
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Limited Recognition under 37 CFR § 10.9(b)

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Expires: November 6, 2003

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